WHAT IS CLAIMED IS:

1. A valve for use in a subterranean well, the valve comprising:

a closure member having open and closed positions; and

a biasing device having a length which decreases as the closure member displaces toward the closed position.

2. The valve according to claim 1, further comprising a beam interconnected between the closure member and the biasing device.

3. The valve according to claim 2, wherein the beam is bent to an increasingly curved configuration, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

4. The valve according to claim 3, wherein the closure member contacts the beam and forces the beam to the increasingly curved configuration, as the closure member displaces toward the open position.

5. The valve according to claim 4, wherein the closure member contacts a position on the beam closer to a connection between the beam and the

closure member than to a connection between the beam and the biasing device, as the closure member displaces toward the open position.

6. The valve according to claim 2, wherein the beam has at least one appendage which is increasingly flexed, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

7. The valve according to claim 1, wherein the biasing device is bent along its length, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

8. The valve according to claim 7, wherein the closure member contacts the biasing device to bend the biasing device, as the closure member displaces toward the open position.

9. The valve according to claim 1, further comprising a beam extending longitudinally within the biasing device, the beam being increasingly flexed, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

10. The valve according to claim 1, wherein the closure member is a flapper, wherein the biasing device is at least one extension spring, and wherein the extension spring is positioned between the flapper and a sidewall of the valve when the flapper is in the open position.

11. A safety valve for use in a subterranean well, the safety valve comprising:

a closure member having open and closed positions; and

at least one extension spring biasing the closure member toward the closed position.

12. The safety valve according to claim 11, wherein there are multiple extension springs biasing the closure member toward the closed position.

13. The safety valve according to claim 12, wherein the extension springs are arranged laterally adjacent each other in the safety valve.

14. The safety valve according to claim 12, wherein the extension springs are circumferentially spaced apart in the safety valve.

15. The safety valve according to claim 12, wherein each of the extension springs independently biases the closure member toward the closed position, such that the extension springs provide redundancy for each other.

16. The safety valve according to claim 12, wherein each of the extension springs is wound in an opposite direction relative to another of the extension springs.

17. The safety valve according to claim 11, wherein a moment applied to the closure member about a pivot by the extension spring increases as the closure member displaces toward the closed position.

18. The safety valve according to claim 11, wherein a moment applied to the closure member about a pivot by the extension spring remains substantially constant as the closure member displaces toward the closed position.

19. The safety valve according to claim 11, wherein a longitudinal axis of the extension spring is increasingly flexed as the closure member displaces toward the open position.

20. The safety valve according to claim 11, wherein the closure member contacts the extension spring, thereby causing the extension spring to flex longitudinally, as the closure member displaces toward the open position.

21. The safety valve according to claim 11, further comprising a beam connected between the closure member and the extension spring.

22. The safety valve according to claim 21, wherein the beam is increasingly bent, thereby increasingly biasing the closure member to the closed position, as the closure member displaces toward the open position.

23. The safety valve according to claim 21, wherein the beam has at least one appendage, the appendage being increasingly bent, thereby increasingly biasing the closure member to the closed position, as the closure member displaces toward the open position.

24. The safety valve according to claim 21, wherein the closure member contacts the beam, causing the beam to bend and increasingly biasing the closure member to the closed position, as the closure member displaces toward the open position.

25. The safety valve according to claim 24, wherein the closure member contacts the beam closer to a connection between the beam and the closure member than to a connection between the beam and the extension spring.

26. The safety valve according to claim 11, further comprising a beam positioned longitudinally within the extension spring, the beam being increasingly flexed, thereby increasingly biasing the closure member to the closed position, as the closure member displaces toward the open position.

27. The safety valve according to claim 11, further comprising a biasing device positioned between the closure member and a sidewall of the safety valve when the closure member is in the open position, the biasing device biasing the closure member toward the closed position.

28. The safety valve according to claim 27, wherein the biasing device is carried on the closure member.

29. The safety valve according to claim 27, wherein the biasing device is carried on the safety valve sidewall.

30. The safety valve according to claim 11, wherein the closure member is a flapper.

31. A safety valve for use in a subterranean well, the safety valve comprising:

a closure member having open and closed positions;

a first biasing device for biasing the closure member toward the closed position; and

a first beam interconnected between the first biasing device and the closure member, the first beam being flexed to an increasingly curved configuration, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

32. The safety valve according to claim 31, wherein the first beam has at least one appendage, the appendage being increasingly flexed, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

33. The safety valve according to claim 31, wherein the first biasing device lengthens, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

34. The safety valve according to claim 31, wherein a moment applied to the closure member about a pivot by the first biasing device increases as the closure member displaces toward the closed position.

35. The safety valve according to claim 31, wherein a moment applied to the closure member about a pivot by the first biasing device remains substantially constant as the closure member displaces toward the closed position.

36. The safety valve according to claim 31, wherein a longitudinal axis of the first biasing device is increasingly flexed as the closure member displaces toward the open position.

37. The safety valve according to claim 31, wherein the closure member contacts the first biasing device, thereby causing the first biasing device to flex longitudinally, as the closure member displaces toward the open position.

38. The safety valve according to claim 31, further comprising a second beam positioned within the first biasing device, the second beam being increasingly flexed, thereby increasingly biasing the closure member to the closed position, as the closure member displaces toward the open position.

39. The safety valve according to claim 31, further comprising a second biasing device positioned between the closure member and a sidewall of the

safety valve when the closure member is in the open position, the second biasing device biasing the closure member toward the closed position.

40. The safety valve according to claim 39, wherein the second biasing device is carried on the closure member.

41. The safety valve according to claim 39, wherein the second biasing device is carried on the safety valve sidewall.

42. The safety valve according to claim 31, wherein the first biasing device is an extension spring.

43. The safety valve according to claim 31, wherein the closure member is a flapper.

44. A safety valve for use in a subterranean well, the safety valve comprising:

a closure member having open and closed positions; and

a first biasing device for biasing the closure member toward the closed position, the first biasing device being flexed to an increasingly curved configuration, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

45. The safety valve according to claim 44, wherein the closure member contacts the first biasing device to flex the first biasing device as the closure member displaces toward the open position.

46. The safety valve according to claim 44, further comprising a beam interconnected between the first biasing device and the closure member, the beam being flexed to an increasingly curved configuration, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

47. The safety valve according to claim 46, wherein the first beam has at least one appendage, the appendage being increasingly flexed, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

48. The safety valve according to claim 44, wherein the first biasing device lengthens, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

49. The safety valve according to claim 44, wherein a moment applied to the closure member about a pivot by the first biasing device increases as the closure member displaces toward the closed position.

50. The safety valve according to claim 44, wherein a moment applied to the closure member about a pivot by the first biasing device remains substantially constant as the closure member displaces toward the closed position.

51. The safety valve according to claim 44, further comprising a beam positioned within the first biasing device, the beam being increasingly flexed, thereby increasingly biasing the closure member to the closed position, as the closure member displaces toward the open position.

52. The safety valve according to claim 44, further comprising a second biasing device positioned between the closure member and a sidewall of the

safety valve when the closure member is in the open position, the second biasing device biasing the closure member toward the closed position.

53. The safety valve according to claim 52, wherein the second biasing device is carried on the closure member.

54. The safety valve according to claim 52, wherein the second biasing device is carried on the safety valve sidewall.

55. The safety valve according to claim 44, wherein the first biasing device is an extension spring.

56. The safety valve according to claim 44, wherein the closure member is a flapper.

57. The safety valve according to claim 44, further comprising a second biasing device positioned within the first biasing device.

58. The safety valve according to claim 57, wherein the second biasing device is flexed to an increasingly curved configuration, thereby increasingly biasing the closure member toward the closed position, as the closure member displaces toward the open position.

59. A safety valve for use in a subterranean well, the safety valve comprising:

a closure member having open and closed positions; and

a biasing device for biasing the closure member toward the closed position, the biasing device including a beam having at least one side and at least one appendage extending in a same longitudinal direction from a central portion, the beam being compressed laterally when the closure member displaces toward the open position.

60. The safety valve according to claim 59, wherein the side and the appendage are flexed toward each other when the closure member displaces toward the open position.

61. The safety valve according to claim 59, wherein the side has opposite ends, one of the opposite ends being attached to the closure member, and the other opposite end being attached to the central portion.

62. The safety valve according to claim 61, wherein the side is pivotably attached to the closure member.

63. The safety valve according to claim 59, wherein the side and the appendage are compressed between the closure member and a sidewall of a

housing of the safety valve when the closure member displaces to its closed position.

64. The safety valve according to claim 59, wherein there are two of the sides laterally adjacent each other, each of the sides having a laterally outwardly extending peg for attachment to the closure member, and wherein each side further has a laterally inwardly extending stop formed thereon for limiting laterally inward displacement of the sides toward each other.

65. The safety valve according to claim 59, wherein each of the side and the appendage has a bend formed thereon, so that the side and appendage diverge from each other in the longitudinal direction.

66. The safety valve according to claim 65, wherein the bends in the side and appendage contact each other during displacement of the closure member to the open position, thereby limiting displacement of the side and appendage toward each other at the central portion.

67. The safety valve according to claim 59, further comprising a spring attached to the biasing device, the spring lengthening as the closure member displaces toward its open position.

68. The safety valve according to claim 67, wherein the spring is attached to the central portion.

69. The safety valve according to claim 67, wherein the spring applies a biasing force to the closure member through the biasing device.